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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/802,161	03/08/2001	Christopher Keith	0505-4007	1139
24259	7590	12/29/2005	EXAMINER	
BRENDA POMERANCE LAW OFFICE OF BRENDA POMERANCE 260 WEST 52 STREET SUITE 27B NEW YORK, NY 10019			GRAHAM, CLEMENT B	
			ART UNIT	PAPER NUMBER
			3628	

DATE MAILED: 12/29/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/802,161

Applicant(s)

KEITH, CHRISTOPHER

Examiner

Clement B. Graham

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 16 September 2005.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-27 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-27 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

**DETAILED ACTION**  
**Claim Rejections - 35 USC § 101**

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claims 2-9, 11-14, 1-21 and 23-27, are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

The basis of this rejection is set forth in a two prong test of:

- (1) whether the invention is within the technological arts; and
- (2) whether the invention produces a useful, concrete and tangible result.

For a claimed invention to be statutory, the claimed invention must be within the technological arts. Mere ideas in the abstract (i.e., abstract idea, law of nature, natural phenomena) that do not apply, involve, use or advance the technological arts fail to promote the "progress of science and the useful arts" (i.e., the physical sciences as opposed to social sciences, for example) are found to be non-statutory subject matter. For a process claim to pass muster, the recited process must somehow apply, involve, use, or advance the technological arts. In the present case, claims 2-9, 11-14, 1-21 and 23-27, do not recite any structure or functionality to suggest that a computer performs the recited claims. Thus, claims 2-9, 11-14, 1-21 and 23-27, are rejected as being directed to non-statutory subject matter.

**Claim Rejections - 35 USC § 102**

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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3. Claims 1-27, are rejected under 35 U.S.C. 102(b) as being anticipated by May U.S Patent 6, 421, 653).

As per claim 1, May discloses a method of operating at least two markets, comprising: automatically using at least one computer representing an order in a first market and a second market, each of the first and second markets being able to execute the order and operating independently of each other and automatically using the least one computer ensuring the order is executed in at most one of the first and second markets.(Note abstract and see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 2, May discloses wherein each of the first and second markets operates according to a two phase action protocol, and the automatically ensuring includes obtaining permission to act from a controlling process. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 3, May discloses wherein the permission is an affirmation to act upon a specified number of shares of the order. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 4, May discloses wherein the controlling process is a trading process. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 5, May discloses wherein the controlling process is a market process. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 6, May discloses wherein one of the markets is in fast symbol mode, and the automatically ensuring includes canceling the order from the fast symbol market before executing in the other of the markets . (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

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As per claim 7, May discloses wherein the automatically ensuring includes determining whether the order is in process at another market . (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 8, May discloses wherein the order includes an order tail indicating the markets in which it is represented . (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 9, May discloses wherein a platform process maintains a market file indicating the markets in which an order is represented, and wherein the automatically ensuring includes checking the market file . (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 10, May discloses a method of representing an order in at least two markets, comprising: automatically using at least one computer sending the order to at least two markets each of the at least two markets being able to execute the order and operating independently of each other and automatically using the least one computer ensuring that execution authority for the order is in a single point. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 11, May discloses wherein the single point is a trading process. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 12, May discloses wherein the order is associated with information indicating where execution authority for the order resides. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 13, May discloses wherein the associated information indicates whether any market at which the order is represented is in process, and the single point is the in process market. (see column 1 lines 19-29 and lines 54-

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67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 14, May discloses wherein the associated information is used to determine whether a process can declare itself to be the single point. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 15, May discloses a method of representing an order in at least two markets, comprising: using the least one computer automatically affirming availability of shares of the order to one of the at least two markets, markets each of the at least two markets being able to execute the order and operating independently of each other and automatically using the least one computer receiving a pairing report from the one market for at least one of the affirmed shares. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 16, May discloses further comprising automatically canceling the paired shares from another of the at least two markets. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 17, May discloses further comprising placing an instruction to cancel at least one of the paired shares in a queue when the other market indicated that the at least one paired share was in process at the other market. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 18, May discloses further comprising checking availability of the shares before automatically affirming. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 19, May discloses wherein the checking availability is based on a number of unpaired shares of the order and a number of in process shares

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of the order . (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 20, May discloses further comprising marking shares as in process after affirming their availability. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 21, May discloses wherein the shares are marked as in process for the market to which the shares were affirmed, and further comprising summing the in process shares at all of the markets at which the order is represented to obtain an in process number of shares. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 22, May discloses a method of executing an order in a market, comprising: automatically using at least one computer at a receiving market, receiving the order from a source, the order capable of being represented in at least two markets that operate independently of each other and are each able to execute the order automatically using the at least one computer determining whether the receiving market has authority to execute the order, and automatically, using the least one computer executing the order after the receiving market has determined that it has authority to execute the order. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 23, May discloses wherein the determining includes affirming availability of the order with the source. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 24, May discloses wherein the determining includes checking whether another market has authority to execute the order based on information associated with the order. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

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As per claim 25, May discloses wherein the checking includes examining an order tail . (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 26, May discloses wherein the checking includes examining a central order file. (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

As per claim 27, May discloses wherein automatically determining includes canceling the order from other markets at which it is represented . (see column 1 lines 19-29 and lines 54-67 and column 10 lines 1-8 and column 12 lines 27-46 and column 13 lines 35-65).

#### Conclusion

4. Applicant's arguments filed 9/16/05 has been considered but they are moot in view of new grounds of rejections.

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Clement B Graham whose telephone number is 571-272-6795. The examiner can normally be reached on 7am to 5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hyung S. Souh can be reached on 703-308-0505. The fax phone numbers for the organization where this application or proceeding is assigned are 571-273-8300 for regular communications and 703-305-0040 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-3900.



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CG

December 26, 2005

*FTom*  
FRANK M. TOMLIN  
PATENT EXAMINER  
*AK 3628*